# Web API Specifications for the

# TRACE Securitized Products

# File Downloads

Version 4.2

December 16, 2013

## Revision History

| Version/Date | Changes Made |
|---|---|
| Version 1.1/April 20, 2011 | • Clarification regarding access to files in Protocol section<br>• Listed times for production access to files<br>• Effective Date populated for security additions as well as deletes and changes<br>• “MDYS_RTNG” field changed to “Reserved 3”<br>• Grade field will not contain data; it will be blank filled<br>• 144A field will be “Y or “N” and not blank filled<br>• Appendix 1 - Amended Sub-Product Asset Codes |
| Version 1.2/June 23, 2011 | • Appendix 1 - Amended Sub-Product Asset Codes<br>• Maximum Field Lengths included in file tables |
| Version 2.0/ January 23, 2012 | • Participant Daily List - list_dt format changed to MMDDYYYY format<br>• Participant Daily List - effective_dt format changed to MMDDYYYY format<br>• Participant Daily List - cd_description values changed to:<br>Participant Addition<br>Participant Deletion<br>Participant Change<br><br>Sub Product Asset Code – Added SMBA |
| Version 3.0/March 20, 2012 | • Include a Daily List Timestamp in all Daily List events<br>• Include BSYM (Bloomberg Symbol) in Master File<br>• Include BSYM and NEW BSYM in Daily List Files<br>• Include Tranche ID and New Tranche ID in Daily List Files<br>• |
| Version 3.1/July 6, 2012 | • Modify Appendix 1 - TBA Sub Product Asset Codes and Descriptions |
| Version 3.2/September 4, 2012 (In production November 5, 2012) | • Addition of Closing Price File for TBA Sub Product |
| Version 3.2 production date modified to November 12, 2012 | |
| Version 3.3/December 21, 2012 | Added TBA Coupon Code R (Fixed Rate Reverse) |

| | |
|---|---|
| Version 3.4/February 1, 2013 | • Changed TRAQS references to TRACE |
| Version 4.0/March 25, 2013 (In production July 22, 2013) | • Added RDID Master File for MBS securities<br>• Added RDID Daily List File for MBS securities<br>• Amended Closing Price File to distinguish between MBS and non-MBS securities<br>• Amended MBS Security Master File<br>• Amended MBS Daily List File |
| Version 4.1/June 17, 2013 (In production July 22, 2013) | • Added Appendix 8 to include cross referenced Agency values<br>• Added Agency values N, T<br>• Modified Amortization Type to be a one – byte field – associated values in Appendix 7<br>• Modified Mortgage Product values field to be a one byte field<br>• Added Mortgage Product values H, #<br>• Deleted Mortgage Product values B, D, L, N, P, U |
| Version 4.2/December 16, 2013 (In production February 10 , 2014) | • Added Agency value R to represent Ginnie 1 Serial Notes (Puerto Rico) |

## Introduction

The FINRA TRACE Reporting and Quotation Service is a system developed which consolidates the various fixed income and equity reporting facilities FINRA currently maintains (e.g., TRACE, ADF, OTC Equity Reporting, etc) into a single platform. The secure web interface offers member firms enhanced reporting and data retrieval functionality.

The Download site for Securitized Products supports clients via a Web Application Programming Interface (API) to download security master files, daily lists, and market aggregate information.

This document pertains specifically to Securitized Products reference data. This document outlines the parameters and values for each available Securitized Products file. The data in each of these files is current as of the time of download.

## Access to the file domain

FINRA has implemented the various products it supports in phases; Securitized Products (SP)[1] was the first one to deliver reference data via an API. This document outlines the parameters and values for each available SP file. The data in each of these files is current as of the time of download.

SP file downloads use the NASDAQ Web Security Framework (NWSF) for authentication (proper client authorization for access to particular files must be in place). In order to access the site and download files, a user needs to present a valid NWSF account/password and client certificate with access to the application.

The Security and RDID Masters, Daily Lists and Participant Lists are maintained by FINRA Operations. For questions concerning the data in these files, or to subscribe to receive these files, please contact FINRA Operations at (866) 776-0800 or FINRAOperations@finra.org. For technical questions or issues accessing the files, please contact FINRA Product Management at (866) 899-2107 or. FINRAProductManagement@finra.org.

## Protocol

FINRA's API download site provides access to files using standard HTTP Secure (https) protocol. It is a combination of the Hypertext Transfer protocol and the TLS protocol to provide encrypted communications and secure identification. The URL https://download.finratraqs.org is the domain where the files reside. In order to access file reference data users should refer to the query string detailed on page 4 of this specification. Examples of actual download query strings are available on page 10 of this specification.

## File availability – all times are approximate

| File | Time |
|---|---|
| Start of day security master files; RDID master files | 7:00 a.m. ET |
| Security master and daily list updates; RDID master and RDID daily list updates | Beginning at 8:00 a.m. ET and continuing throughout the day – near real-time |
| Final possible security master, daily list updates, RDID master and RDID daily list updates | 8:00 p.m. ET |

[1] As stated in Regulatory Notice 10-55 (October 2010), effective May 16, 2011, member firms will be required to report trades in asset-backed securities, mortgage-backed securities and other similar securities, collectively defined hereinafter as Securitized Products (SP), to TRACE.

Users may attempt to access the files on non-business days; however, due to server maintenance which occurs on weekends and other non-business days it is possible the user will not have immediate success in access the data during these days.

## URL Parameters

| Parameter | Parameter Options |
|---|---|
| action | **DOWNLOAD -** provide the complete file.<br>**DELTA** – provide the changes since the last time the user downloaded the file.<br><br>Delta files are supported for Security Daily List, Participant Daily List, and RDID Daily List,  but not for the Security Masters, RDID Master or Participant List |
| Facility | **TRACE** |
| File | **PARTICIPANT** – Participant List (current participants with active authorizations for the specified facility)<br>**PDAILYLIST** – Participant Daily List (additions/deletions/changes to the Participant List of the specified facility)<br>**DAILYLISTSP** –  Security Daily List for Securitized Products<br>**DAILYLISTSPRDID** – RDID Daily List<br>**ABSMASTER** – ABS Security Master<br>**CMOMASTER** – CMO Security Master<br>**TBAMASTER** – TBA Security Master<br><br>MBS Security Master, available as subsets (based on the issuing Agency):<br>**MBSSMBA** – MBS Security Master, Small Business Administration (SBA)<br>**MBSFHLM** – MBS Security Master, Federal Home Loan Mortgage Corporation (Freddie Mac)<br>**MBSFNMA** – MBS Security Master, Federal National Mortgage Association (Fannie Mae)<br>**MBSGNM1 –** MBS Security Master, Government National Mortgage Association (Ginnie Mae 1)<br>**MBSGNM2** – MBS Security Master, Government National Mortgage Association (Ginnie Mae 2)<br>**MBSRDID** – RDID Master File<br>**CLOSSP** – Closing Report File |
| day | A date, for example: 6/1/2011. Date is only used for Daily List, RDID Daily List and Closing Report requests. If no date is specified on a daily list or closing report request then the current day is assumed. |

| File | Query Parameters |
|---|---|
| SP ABS Master | action= DOWNLOAD &file=ABSMASTER&facility=TRACE |
| SP CMO Master | action= DOWNLOAD &file=CMOMASTER&facility=TRACE |
| SP TBA Master | action= DOWNLOAD &file=TBAMASTER&facility=TRACE |
| MBS Master – SBA | action= DOWNLOAD &file=MBSSMBA&facility=TRACE |
| MBS Master – Freddie Mac | action= DOWNLOAD &file=MBSFHLM&facility=TRACE |
| MBS Master – Fannie Mae | action= DOWNLOAD &file=MBSFNMA&facility=TRACE |
| MBS Master – Ginnie Mae 1 | action= DOWNLOAD &file=MBSGNM1&facility=TRACE |
| MBS Master – Ginnie Mae 2 | action= DOWNLOAD &file=MBSGNM2&facility=TRACE |
| TRACE Participant Daily List | action=DOWNLOAD&file=PDAILYLIST&facility=TRACE |
| SP Security Daily List | action=DOWNLOAD&file=DAILYLISTSP&facility=TRACE |
| SP Security Daily List delta (See note 1) | action=DELTA&file=DAILYLISTSP&facility=TRACE |
| TRACE Participant Daily List delta (see note 1) | action=DELTA&file=PDAILYLIST&facility=TRACE |
| SP Security Daily List for a specific day | action=DOWNLOAD&file=DAILYLISTSP&facility=TRACE&day=5/16/2011 |
| TRACE Participant List | action=DOWNLOAD&file=PARTICIPANT&facility=TRACE |
| Closing Report File | action=DOWNLOAD&file=CLOSSP&facility=TRACE |
| SP MBS RDID Daily List for a specific day | action=DOWNLOAD&file=DAILYLISTSPRDID&facility=TRACE&day=7/22/2013 |
| MBS RDID Master | action= DOWNLOAD &file=MBSRDID&facility=TRACE |
| MBS RDID Daily List delta (see note 1) | action=DELTA&file= DAILYLISTSPRDID&facility=TRACE |

Note 1: All requests are categorized and recorded. When a DELTA request is made, the time of the previous request is used to determine the items that appear in the DELTA results. The time used for the previous request is the time of request minus five minutes. This ensures that no updates are missed but it can mean items from a previous request may appear in the next DELTA request. Systems should be coded with this in mind.

## File Definitions

All files are pipe delimited files.

**Securitized Products Security Master Files**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| SYM_CD | FINRA assigned Symbol | | 14 |
| CUSIP_ID | CUSIP | This field will be blank for firms that do not have a CUSIP license in place. | 9 |
| BSYM_ID | Bloomberg Symbol | | 12 |
| POOL_NB | Pool Number | Used in MBS Master Files.<br>Will be blank on ABS, CMO and TBA Master Files. | 6 |
| MSTR_DEAL_ID | Master Deal ID | Used in ABS and CMO Master Files.<br>Will be blank on MBS and TBA Master Files. | 50 |
| TRNCH_NB | Tranche ID | Used in ABS and CMO Master Files.<br>Will be blank on MBS and TBA Master Files. | 20 |
| SUB_PRDCT_TYPE | Sub-Product Type Code | Valid values are:<br>ABS *Asset-Backed Securities*<br>CMO *Collateralized Mortgage Obligations*<br>MBS *Mortgage-Backed Securities*<br>TBA *To Be Announced* | 5 |
| SCRTY_SBTP_CD | Sub-Product Asset Code | *Please see Appendix 1 for a list of Sub Product Asset Code / Descriptions* | 5 |
| ISSUER_NM | Issuer Name | | 80 |
| SCRTY_DS | Security Description | | 80 |
| CPN_RT | Coupon Rate | Decimal format | 27 (19 after decimal) |
| CPN_TYPE_CD | Coupon Type Code | *Please see Appendix 2 for a list of Coupon Type Code / Descriptions* | 10 |
| INTRS_TYPE_CD | Interest Type Code | Used in ABS and CMO Master Files. | 10 |

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| | | Will be blank on MBS and TBA Master Files.<br><br>*Please see Appendix 3 for a list of Interest Type Code / Descriptions* | |
| TRD_RPT_EFCTV_DT | Trade Report Effective Date | YYYYMMDD format. | |
| MTRTY_DT | Maturity Date | YYYYMMDD format.<br>Used in ABS, CMO and MBS Master Files.<br>Will be blank on TBA Master Files. | |
| TBA_STLMT_CD | TBA Settlement Month | Two digit value representing the month.<br>Used in TBA Master Files.<br>Will be blank on ABS, CMO and MBS Master Files.<br><br>*Please see Appendix 4 for a list of TBA Settlement Codes / Months* | |
| GRADE | Grade | Will be blank filled | 1 |
| RESERVED3 | Filler | Blank field - reserved for future use. | |
| IND_144A | 144A Indicator | Y = Indicates a 144A security<br>N = Not a 144A security | 1 |
| RESERVED2 | Filler | Blank field - reserved for future use. | |
| DSMTN_SYM_ID | RDID | Used in MBS Master Files.<br>Can have special characters.<br>Will be blank on ABS, CMO, and TBA Master Files. | 25 |

**Securitized Products Daily List (for Securities)**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| DAILY_LIST_DT | Daily List Date | YYYYMMDD format. | |
| DAILY_LIST_TIME | Daily List Time | HH:MM:SS | |
| DAILY_LIST_EVENT_CD | Daily List Event Type | Valid values are:<br>SA *Security Add*<br>SD *Security Delete*<br>SC *Security Change* | 2 |
| DAILY_LIST_RSN_CD | Daily List Reason | Reason for the addition, deletion or change. This field may be blank.<br><br>*Please see Appendix 5 for a list of Daily List Reason Codes / Descriptions* | 5 |
| CMMNT_TX | Event Comment | Free form text field entered by FINRA Operations. May be blank. | 30 |
| EFCTV_DT | Effective Date | Reflects effective date for the event affected in the record. | |
| PROD_TYPE | Product Type | Constant “SP”. | |
| SYM_CD | FINRA Symbol | | 14 |
| CUSIP | | This field will be blank for firms that do not have a CUSIP license in place. | 9 |
| SCRTY_DS | Security Description | | 250 |
| ISSUER_NM | Issuer Name | | 255 |
| CPN_RT | Coupon Rate | Decimal format | 27 (19 after decimal) |
| MTRTY_DT | Maturity Date | YYYYMMDD format. Valid for ABS, CMO and MBS securities. Will be blank on TBA securities. | |
| TBA_STLMT_CD | TBA Settlement Month | Two digit value representing the month. Used in Sub-Product Type TBA if there is a change to Settlement Month. | |

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| | | *Please see Appendix 4 for a list of TBA Settlement Codes / Months* | |
| BSYM_ID | Bloomberg Symbol | | 12 |
| POOL_NB | Pool Number | Valid for MBS securities only.<br>Will be blank on ABS, CMO and TBA securities. | 6 |
| TRNCH_NB | Tranche ID | Used in ABS and CMO Master Files.<br>Will be blank on MBS and TBA Master Files. | 20 |
| SUBPROD_TYPE | Sub-Product Type | Valid values are:<br>ABS *Asset-Backed Securities*<br>CMO *Collateralized Mortgage Obligations*<br>MBS *Mortgage-Backed Securities*<br>TBA *To Be Announced* | 5 |
| TRD_RPT_EFCTV_DT | Trade Report Effective Date | YYYYMMDD format. Will be blank on Delete Event Types. | |
| NEW_SYM_CD | New Symbol | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 14 |
| NEW_CUSIP | New CUSIP | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 9 |
| NEW_SCRTY_DS | New Security Description | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 250 |
| NEW_ISSUER_NM | New Issuer | Applicable to Change Event Types only. Will be blank on Add and | 255 |

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| | | Delete Events. | |
| NEW_CPN_RT | New Coupon Rate | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 27 (19 after decimal) |
| NEW_MTRTY_DT | New Maturity Date | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | |
| NEW_TBA_STLMT_CD | New TBA Settlement Month | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | |
| NEW_BSYM_ID | New Bloomberg Symbol | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 12 |
| NEW_POOL_NB | New Pool Number | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 6 |
| NEW_TRNCH_NB | New Tranche ID | Used in ABS and CMO Master Files.<br>Will be blank on MBS and TBA Master Files. | 20 |
| NEW_SUBPROD_TYPE | New Sub Product Type | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | 5 |
| NEW_TRD_RPT_EFCTV_DT | New Trade Report Effective Date | Applicable to Change Event Types only. Will be blank on Add and Delete Events. | |
| DSMTN_SYM_ID | RDID | Used in MBS Files. Addition events only. Can include special characters. Will be blank on ABS, CMO, and TBA Files. | 25 |

**TRACE Participant List**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| mpid | Market Participant Identifier | FINRA identifier assigned to the participant | 6 |
| dba_nm | Firm Name | | 64 |

**TRACE Participant Daily List**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| list_dt | Daily List Date | MMDDYYYY format | |
| effective_dt | Effective Date | MMDDYYYY format | |
| cd_description | Event Type | Valid values are:<br>PA Participant Addition<br>PD Participant Deletion<br>PC Participant Change | |
| old_mpid | Market Participant Identifier | | 6 |
| old_dba | Firm Name | | 64 |
| new_mpid | New Market Participant Identifier | | 6 |
| new_dba | New Firm Name | | 64 |
| rf_cd | Reporting Facility | Value will always be TRACE | |

**Securitized Products Closing Report**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| SYM_CD | FINRA assigned Symbol | This field will be blank for MBS securities | 14 |
| CUSIP_ID | CUSIP | This field will be blank for firms that do not have a CUSIP license in place.<br><br>This field will be blank for MBS securities. | 9 |
| BSYM_ID | Bloomberg Symbol | This field will be blank for MBS securities. | 12 |
| SUB_PRODUCT | | TBA; ABS; CMO; MBS | 5 |
| HIGH_PRICE | High Price | | 10 |
| LOW_PRICE | Low Price | | 10 |
| CLOSING_PRICE | Closing Price | | 10 |
| TRADE_DATE | Trade Date for the record's prices | Closing price date in mm/dd/yyyy format | |
| DSMTN_SYM_ID | Reference Data Identifier (MBS only) | This field will be only be populated for MBS securities. Can include special characters. | 25 |

**Securitized Products MBS RDID Master Files**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| DSMTN_SYM_ID | RDID | Ticker for each MBS security. Can include special characters. | 25 |
| base_sym_id | Agency | Issuing Agency. Refer to Appendix 8 for details. | 10 |
| prpty_type_cd | Mortgage Product | Type of underlying mortgage. Refer to Appendix 6 for details. | 1 |
| amrtn_type_cd_ | Amortization Type | Refer to Appendix 7 for details. | 1 |
| cpn_rt | Coupon | Term coupon of the pool. | 8 |
| orgnl_term_lm_ | Original Maturity | Pool maturity in years. | 6 |
| wac_rt | Weighted Average Coupon | | 8 |
| wam_lm | Weighted Average Maturity | | 8 |
| wala_lm | Weighted Average Loan Age | | 6 |
| updtd_wghtd_avg_loan_am | Average Loan Size | | 6 |
| orgnl_wgh | Loan to Value | | 6 |

**Securitized Products MBS RDID Daily List**

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| DAILY_LIST_DT | Daily List Date | YYYYMMDD format. | |
| DAILY_LIST_TIME | Daily List Time | HH:MM:SS format. | |
| DAILY_LIST_EVENT_CD | Daily List Event Type | Valid values are: *RDID Add* | |
| DSMTN_SYM_ID | RDID | Ticker for each MBS security. Can include special characters. | 25 |
| base_sym_id | Agency | Issuing Agency. Refer to Appendix 8 for details. | 10 |
| prpty_type_cd | Mortgage Product | Type of underlying mortgage. Refer to Appendix 6 for details. | 1 |
| amrtn_type_cd_ | Amortization Type | Refer to Appendix 7 for details. | 1 |
| cpn_rt | Coupon | Term coupon of the pool. | 8 |
| orgnl_term_lm_ | Original Maturity | Pool maturity in years. | 6 |
| wac_rt | Weighted Average Coupon | | 8 |
| wam_lm | Weighted Average | | 8 |

| Field Name (Header) | Description | Comments | Maximum Length |
|---|---|---|---|
| | Maturity | | |
| wala_lm | Weighted Average Loan Age | | 6 |
| updtd_wghtd_avg_loan_am | Average Loan Size | | 6 |
| orgnl_wgh | Loan to Value | | 6 |

## Example Requests

### *Ex 1 - Get the current TRACE Participant List*

This request retrieves the current list of TRACE authorized Participants:

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=PARTICIPANT&facility=TRACE

### *Ex 2 - Get the TRACE Participant Daily List for 5/16/2011*

This request retrieves the list of changes to TRACE authorized Participants published on 5/16/2011 (*note 5/6/2011 is used as an example. Any specific date may be used*):

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=PDAILYLIST&facility=TRACE&day=5/16/2011

### *Ex 3 - Get today's TRACE Participant Daily List (no day provided)*

This request retrieves the current day's cumulative list of changes to TRACE authorized Participants:

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=PDAILYLIST&facility=TRACE

### *Ex 4 - Get changes to the TRACE Participant Daily List since the last download (no day provided)*

This request retrieves the latest list of changes to TRACE authorized Participants since the last user download of the Participant List:

https://download.finratraqs.org/DownloadHandler.ashx?action=DELTA&file=PDAILYLIST&facility=TRACE

### *Ex 5 - Get the current SP CMO Security Master File*

This request retrieves the current list of all CMO Securities for Securitized Products:

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=CMOMASTER&facility=TRACE

### *Ex 6 - Get the current SP Fannie Mae Security Master File*

This request retrieves the current list of all Fannie Mae MBS Securities:

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=MBSFNMA&facility=TRACE

### *Ex 7 - Get today's SP Daily List (no day provided)*

This request retrieves the current day's cumulative list of changes to all the Securitized Products Security Masters (ABS, CMO, MBS and TBA data is contained in one file):

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=DAILYLISTSP&facility=TRACE

### *Ex 8 – Get the SP Closing Report (no day provided)*

This request retrieves the closing prices for SP securities.

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=CLOSSP&facility=TRACE

### *Ex 9 – Get the RDID Master File*

This request retrieves the RDID's for all MBS securities assigned an RDID.

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=MBSRDID&facility=TRACE

### *Ex 10– Get the RDID Daily List (no day provided)*

This request retrieves the current day's cumulative list of RDID additions.

https://download.finratraqs.org/DownloadHandler.ashx?action=DOWNLOAD&file=DAILYLISTSPRDID&facility=TRACE

## Sample Results

TRACE Participant Daily List File from illustrating the header and footer.

```
list_dt|effective_dt|cd_description|old_mpid|old_dba|new_mpid|new_dba|rf_cd
09/09/2010|09/09/2010|Participant Addition|||HRBC|hurleyf test HRBC mppweb|OTCE
09/09/2010|09/09/2010|Participant Addition|ABNE|ABNE TEST|||TRACE
09/09/2010|09/09/2010|Participant Addition|ABNF|ABNF TEST|||TRACE
09/09/2010|09/09/2010|Participant Addition|ABNB|ABN AMRO CLEARING CHICAGO LLC|||TRACE
09/09/2010|09/09/2010|Participant Addition|ABNC|ABNC TEST|||TRACE
…
[snip]
…
09/09/2010|09/09/2010|Participant Deletion|AALC|THRIVENT INVESTMENT MANAGEMENT CO2|||TRACE
Footer - Count: 00000014, Facility:TRACE,  File Created: 20100910120732
```

SP Security Daily List File from illustrating the header and footer.

```
DAILY_LIST_DT|DAILY_LIST_TIME|DAILY_LIST_EVENT_CD|DAILY_LIST_RSN_CD|CMMNT_TX|EFCTV_DT|PROD_TYPE|S
YM_CD|CUSIP|SCRTY_DS|ISSUER_NM|CPN_RT|MTRTY_DT|TBA_STLMT_CD|BYSM_ID|POOL_NB|TRNCH_NB|SUBPROD_TYPE
|TRD_RPT_EFCTV_DT|NEW_SYM_CD|NEW_CUSIP|NEW_SCRTY_DS|NEW_ISSUER_NM|NEW_CPN_RT|NEW_MTRTY_DT|NEW_TBA
_STLMT_CD|NEW_BSYM_ID|NEW_POOL_NB|NEW_TRNCH_NB|NEW_SUBPROD_TYPE|NEW_TRD_RPT_EFCTV_DT|DSMTN_SYM_ID
20120731|01:28:28|SD||Security EOD inactivated.|20120731|SP|CSHV3304436|12644NMY9|CSMC 109R20 A2
Fix CSMC SERIES 2010-9R (A2) |CSMC MORTGAGE BACKED
TRUST|3.7500000000000000000|20370127||BBG000VWZQ53||A2|CMO|20110516||||||0|||||
20120731|01:28:28|SD||Security EOD inactivated.|20120731|SP|CSHV3304460|12644NPD2|CSMC 109R22 A1
Fix CSMC SERIES 2010-9R (A1) |CSMC MORTGAGE BACKED
TRUST|3.7500000000000000000|20370527||BBG000VWZYF5||A1|CMO|20110516||||||0|||||
20120731|01:28:28|SD||Security EOD inactivated.|20120731|SP|CSHV3304459|12644NPM2|CSMC 109R22 A9
Fix CSMC SERIES 2010-9R (A9) |CSMC MORTGAGE BACKED
TRUST|3.7500000000000000000|20370527||BBG000VX00N6||A9|CMO|20110516||||||0|||||
20120731|01:28:28|SD||Security EOD inactivated.|20120731|SP|CSHV3302633|22943YTW9|CSMC 093R26 262
Seq Vari CSMC SERIES 2009-3R (262)|CSMC MORTGAGE BACKED
TRUST|2.9722300000000000000|20350727||BBG000B6VZF5||262|CMO|20110516||||||0|||||
20120731|01:28:28|SD|||
```

SP Security Master File from illustrating the header and footer.

```
SYM_CD|CUSIP_ID|BSYM_ID|POOL_NB|MSTR_DEAL_ID|TRNCH_NB|SUB_PRDCT_TYPE|SCRTY_SBTP_CD|ISSUER_NM|SCRT
Y_DS|CPN_RT|CPN_TYPE_CD|INTRS_TYPE_CD|TRD_RPT_EFCTV_DT|MTRTY_DT|TBA_STLMT_CD|GRADE|RESERVED3|IND_
144A|RESERVED2|DSMTN_SYM_ID
FNMA2275168|31375MHG1|BBG000B6PJ59|338731|||MBS|POOL|FEDERAL NATIONAL MORTGAGE ASSOCIATION|FNMA
CONV 30 YR SF|6.5000000000000000000|L||20110516|20260301||||N||
FNMA2309067|31378EN53|BBG000B8YV85|396512|||MBS|POOL|FEDERAL NATIONAL MORTGAGE ASSOCIATION|FNMA
SF ARM; 1YR CMT; EXTENDED FIXED INITIAL PERIOD; ANNUAL CHANGES THEREAFTER;
|2.4490000000000000000|A||20110516|20370801||||N||
FNMA2314579|31378MX88|BBG000B98GG6|403103|||MBS|POOL|FEDERAL NATIONAL MORTGAGE ASSOCIATION|FNMA
CONV 20 YR SF|7.0000000000000000000|L||20110516|20171101||||N||
FNMA2326513|31374SY39|BBG000B9LJQ4|323030|||MBS|POOL|FEDERAL NATIONAL MORTGAGE ASSOCIATION|FNMA
CONV 30 YR SF|6.5000000000000000000|L||20110516|20280301||||N||
FNMA2332733|31378VJQ4|BBG0000S80B6|409871|||MBS|POOL|FEDERAL NATIONAL MORTGAGE ASSOCIATION|FNMA
SF ARM; 1YR CMT; EXTENDED FIXED INITIAL PERIOD; ANNUAL CHANGES THEREAFTER;
|2.5880000000000000000|A||20110516|20280401||||N||
FNMA2337773|31379MDU
```

TRACE Participant List File illustrating the header and footer.

```
mpid|dba_nm
AAAA|TEST
ABLE|NATIXIS BLEICHROEDER INC.
ABNA|ABN AMRO SECURITIES (USA) LLC
ABNB|ABN AMRO CLEARING CHICAGO LLC
ABNC|ABNC TEST
ABND|ABND TEST
ABNE|ABNE TEST
ABNG|ABNG TEST
ABPI|PAVEK INVESTMENTS INC.
…
[snip]
…
QUAL|QUAYLE & CO. SECURITIES
ROCK|ROCKWELL GLOBAL CAPITAL LLC
SCHO|SCHOFF & BAXTER, INC.
TMBR|TIMBER HILL LLC
UBSS|UBS SECURITIES LLC
WONG|A B WONG CAPITAL LLC
WTCO|WILLIAMS TRADING LLC
Footer - Count: 00000089, Facility: TRACE, File Created: 20100910121322
```

## Appendices

Please note all codes/descriptions in the following appendices are subject to continual updates as necessary.

***Appendix 1 - Sub-Product Asset Codes and Descriptions***

| Sub-Product Code | Sub Product Asset Code | Sub Product Asset Description |
|---|---|---|
| MBS | POOL | Agency Pass-through Securities<br>SBA pools |
| TBA | GD<br>NGD | For Good Delivery<br>Not For Good Delivery |
| CMO | AGRI<br>TRAN<br>WHLN<br>HLOC<br>HOME | CMO Agriculture MBS<br>CMO Tranches<br>CMO Whole Loan<br>Home Equity Lines of Credit<br>Home Equity Loans |

| | | |
|---|---|---|
| ABS | ALEA | Auto Lease Loans |
| | AFLP | Auto Floor Plan/Wholesale Loans |
| | AUTO | Auto Installment Loans |
| | RECR | Recreational Vehicle Loans |
| | BIKE | Motorcycle Lease |
| | SBA | Small Business Administration |
| | CARD | Credit Card Receivables |
| | STUD | Student Loan |
| | MANU | Manufactured Housing Loan |
| | AIRL | Aircraft Lease |
| | BOAT | Marine Loans |
| | BUSL | ABS Business Loans |
| | CNSL | Consumer Loans |
| | EQIP | Equipment Backed Loan |
| | EXIM | Export/Import Bank Loan |
| | NIM | Net Interest Margin Securities |
| | OTHR | Asset Backed Tranches |
| | RVMG | Reversed Mortgage |
| | UTIL | Utility Standard Cost Securitizations |
| | CTSR | Catastrophe ABS |
| | LOTT | Lottery ticket ABS |
| | PNSN | Pension Securitization |
| | PSNL | Personal Loan ABS |
| | RENT | Rent ABS |
| | RINS | Reinsurance ABS |
| | TMSH | Timeshare ABS |
| | CBO | Collateralized Bond Obligation |
| | CDO | Collateralized Debt Obligation |
| | CFO | Collateralized Fund Obligation |
| | CLO | Collateralized Loan Obligation |
| | CMBS | Commercial Mortgage Backed Security |

### Appendix 2 - Coupon Type Codes and Descriptions

| Sub Product | Coupon Type Code | Coupon Type Description |
|---|---|---|
| ABS | ARB | Ascending Rate |
| ABS | CFLT | Complex Floater |
| ABS | DRB | Descending Rate |
| ABS | FIX | Fixed |
| ABS | FLT | Floater |
| ABS | FLTFX | Floater to Fixed |
| ABS | FLTVAR | Floater to Variable |
| ABS | FLTWAC | Floater to WAC |
| ABS | FXFL | Fixed to Floater |
| ABS | FXVAR | Fixed to Variable |
| ABS | FXWAC | Fixed to WAC |
| ABS | INV | Inverse Floating Rate |
| ABS | STRFLT | Structured Floater |
| ABS | STRINV | Structured Inverse Floater |
| ABS | TFLT | Toggle Floater |
| ABS | TINV | Toggle Inverse |
| ABS | VAR | Variable |
| ABS | WGTSUB | Weighted Average of Subordinate |
| CMO | ARB | Ascending Rate |
| CMO | CFLT | Complex Floater |
| CMO | DRB | Descending Rate |
| CMO | FIX | Fixed |
| CMO | FLT | Floater |
| CMO | FLTFX | Floater to Fixed |
| CMO | FLTVAR | Floater to Variable |
| CMO | FLTWAC | Floater to WAC |
| CMO | FXFL | Fixed to Floater |
| CMO | FXVAR | Fixed to Variable |
| CMO | FXWAC | Fixed to WAC |
| CMO | INV | Inverse Floating Rate |
| CMO | STRFLT | Structured Floater |
| CMO | STRINV | Structured Inverse Floater |
| CMO | TFLT | Toggle Floater |
| CMO | TINV | Toggle Inverse |
| CMO | VAR | Variable |
| CMO | WGTSUB | Weighted Average of Subordinate |
| MBS | A | ARM |
| MBS | B | BALLOON |
| MBS | G | GPM |
| MBS | H | GEM |
| MBS | L | LEVEL PAY |
| MBS | T | TPM |
| MBS | W | BIWEEKLY |
| TBA | A | ARM |
| TBA | B | BALLOON |
| TBA | G | GPM |

| | | |
|---|---|---|
| TBA | H | GEM |
| TBA | L | LEVEL PAY |
| TBA | R | FIXED RATE REVERSE |
| TBA | T | TPM |
| TBA | W | BIWEEKLY |

**Appendix 3 - Interest Type Codes and Descriptions**

| Interest Type Code | Interest Type Description |
|---|---|
| IOET | Ioette |
| IONTL | Interest Only Notional |
| PNTL | Partial Notional |
| PO | Principal Only |
| POHYB | Hybrid Principal Only |
| STPCLL | Step-Up on Call |
| STPCLWAC | Step-Up on Call Subject to WACCAP |
| STPDT | Step-Up on Date |
| STPDTWAC | Step-Up on Date Subject to WACCAP |
| STPRLY | Step-Up on Earliest Call or Date |
| STPRYWAC | Step-Up on Earliest Call or Date, Subject to WACCAP |
| WACCAP | WAC Cap |

**Appendix 4 - TBA Settlement Codes and Months**

| TBA Settlement Code | Month |
|---|---|
| 01 | January |
| 02 | February |
| 03 | March |
| 04 | April |
| 05 | May |
| 06 | June |
| 07 | July |
| 08 | August |
| 09 | September |
| 10 | October |
| 11 | November |
| 12 | December |

## Appendix 5 - Daily List Update Reason Codes and Descriptions

| Update Reason Code | Update Reason Description |
|---|---|
| *blank* | *No reason given* |
| MOT | Moved from OTCE |
| DNY | Delisted from NYSE |
| DAX | Delisted from AMEX |
| DAR | Delisted from ARCA |
| DNQ | Delisted from NASDAQ |
| DEX | Delisted from Exchange |
| ISV | Ineligible – Sovereign |
| ICD | Ineligible – CD |
| ICR | Ineligible – Currency |
| IMM | Ineligible – Money Market |
| ITR | Ineligible – Treasury |
| IAI | Ineligible – Accredited Investor |
| IRS | Ineligible – Other |
| BR | Bankruptcy |
| LIQ | Liquidation |
| CAL | Called |
| RED | Redeemed |
| EXC | Exchanged |
| CAN | Cancelled |
| A/M | Acquisition/Merger |
| MAT | Matured |
| LNY | Listed on the NYSE |
| LAR | Listed on the NYSE ARCA |
| LAX | Listed on AMEX |
| LNQ | Listed on NASDAQ |
| LCB | Listed on CBOE |
| ROB | Reportable to the OTCBB |
| RON | Reportable on the OTC NBB |
| RMS | Reportable to the MSRB |
| 12J | 12(j) Registration Revoked by the SEC |
| RNC | Regulatory Non Compliance |
| OTH | Other * |

*where OTH is used, please refer to the Event Comments field in the file (CMMNT_TX) for additional information.

**Appendix 6 – RDID Mortgage Product Values**

| Value | Description |
|---|---|
| C | Co-Op |
| H | Home Improvement Loans |
| M | Multi-Family |
| S | Single Family |
| # | SBA; unknown |

**Appendix 7 - Amortization Type Values**

| Value | Description |
|---|---|
| A | ARM |
| B | Balloon Mortgages |
| W | BiWeekly Mortgages |
| Y | Buydown Mortgages |
| D | Discount Mortgages |
| H | Growing-Equity Mortgages |
| G | Graduated-Payment Mortgages |
| L | Level-Payment Mortgages |
| T | Tiered-Payment Mortgages |
| R | Reverse Mortgages |

**Appendix 8 – Issuing Agency Values**

| Value | Description |
|---|---|
| G | GNM1 |
| N | GNM2 |
| F | FNMA |
| M | FMCC |
| S | SMBA |
| T | Test |
| R | Ginnie 1 – Serial Notes<br>(Puerto Rico) |

## Programmatic Access (C#, .NET example)

The following is a code excerpt to illustrate how to use the MPP Download site programmatically. If you are going to access the site with an application the first step is to download the NWSF client certificate using your web browser. Install it in the browser then export the certificate from the browser, saving the certificate to a location on the machine as an X905 certificate (.cer).

***Example using the TBA Security Master:***

```
string Action = "DOWNLOAD";
string file = "TBAMASTER";
string facility = "TRACE";

string site =     "https:// download.finratraqs.org/DownloadHandler.ashx";
string query = string.Format("{0}?action={1}&file={2}&facility={3}", site,
                              Action, file, facility);

// Create request
HttpWebRequest webRequest = WebRequest.Create(query) as HttpWebRequest;

// Get cert and add to request
X509Certificate Cert =
      X509Certificate.CreateFromCertFile("C:\\MPP\\cert\\mpp_cert.cer");

webRequest.ClientCertificates.Add(Cert);
webRequest.Method = "GET";


// Add nwsf user/password to request

NetworkCredential nwCredentials = new NetworkCredential("user", "pwd");
webRequest.Credentials = nwCredentials;

// Make the request
HttpWebResponse Response = (HttpWebResponse)webRequest.GetResponse();

// Fiddle with the header in the response to get the file name

int pos = Response.Headers["Content-Disposition"].IndexOf("TRACE");

string Filename = Response.Headers["Content-Disposition"].Substring(pos);

// Create a file to save it in ..
StreamWriter sw = new StreamWriter("C:\\MPP\\files\\" + Filename, false);

StreamReader sr = new StreamReader(Response.GetResponseStream(),
                              Encoding.Default);
int cnt;
char [] ReadBuf = new char[1024];

while ((cnt = sr.Read(ReadBuf, 0, 1024)) != 0)
{
  sw.Write(ReadBuf);
}
```